

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269



Scaled data based on original data using
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for
Cooper Lighting Solutions

Brand: NEO-RAY

Report Number: P997569

Luminaire Tested: SA2XXDP-B290DB2750-4F0-XX-W2A-A_3500K

Issue Date: 5/2/2025

Test Information

Test Method: LM-79-2019
Report Number: P997569
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1802-639-19)
Test Lab: INNOVATION CENTER
Issue Date: 5/2/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: SA2XXDP-B290DB2750-4F0-XX-W2A-A_3500K
Description: Define 2 Direct Recessed with 3500K BioUP LEDs {m-DER=0.721} {m-EER=0.792}
Light Source: -
Ballast/Driver: -

Summary

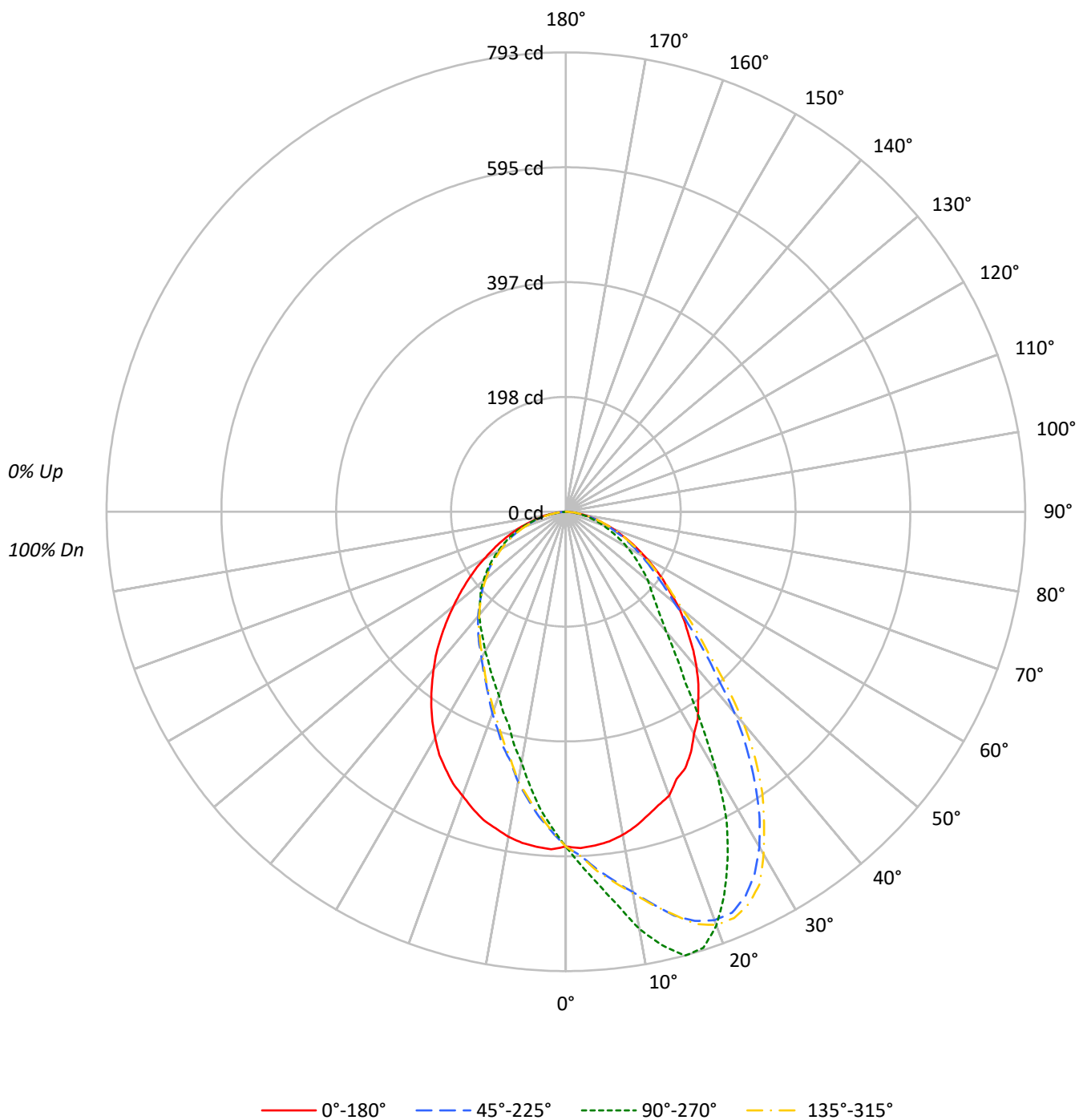
Lumens per Lamp: N/A
Luminaire Lumens: 1275.0 lumens
Efficiency: N/A
Efficacy: 98.1 lumens/watt
Spacing Criteria (0/90/45): 1.16 / 1.09 / 1.23
Luminous Opening: Rectangular (W 0.17' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 13
Input Voltage (V):
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT

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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20				20				20				
RC	80				70				50				30				10				0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0			
RCR																					
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100			
1	110	106	102	98	107	103	100	97	99	96	94	95	93	91	92	90	88	86			
2	101	94	87	82	98	92	86	81	88	83	79	85	81	78	82	79	76	74			
3	93	83	76	70	90	82	75	69	79	73	68	76	71	67	74	69	66	64			
4	86	75	66	60	83	73	66	60	71	64	59	69	63	58	66	62	58	55			
5	79	67	59	53	77	66	58	52	64	57	52	62	56	51	60	55	51	49			
6	74	61	53	47	72	60	52	46	58	51	46	57	51	46	55	50	45	43			
7	69	56	48	42	67	55	47	42	54	46	41	52	46	41	51	45	41	39			
8	64	51	43	38	63	51	43	38	49	42	37	48	42	37	47	41	37	35			
9	60	47	39	34	59	47	39	34	46	39	34	45	38	34	44	38	34	32			
10	56	44	36	31	55	43	36	31	42	36	31	41	35	31	41	35	31	29			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°	270°
0°	9148	9148	9148	9148
5°	9189	10255	9226	8159
10°	9102	11751	9160	7061
15°	8902	13000	9026	6239
20°	8785	12802	8785	5687
25°	8527	11545	8565	5338
30°	8086	9539	8242	5083
35°	7699	6953	7828	4901
40°	7251	5552	7334	4800
45°	6691	4853	6801	4663
50°	6213	4561	6223	4573
55°	5663	4206	5699	4449
60°	5078	3853	5148	4261
65°	4558	3510	4641	4075
70°	4050	3184	4151	3804
75°	3480	2826	3615	3370
80°	2835	2434	3036	2716
85°	2089	2179	2252	1616

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 155°

Vertical Angle: 45°

Luminance: 11943 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	55.0	4.3
10°-20°	160.2	12.6
20°-30°	232.5	18.2
30°-40°	245.1	19.2
40°-50°	216.9	17.0
50°-60°	173.2	13.6
60°-70°	117.6	9.2
70°-80°	60.2	4.7
80°-90°	14.2	1.1
90°-100°	0.0	0.0
100°-110°	0.0	0.0
110°-120°	0.0	0.0
120°-130°	0.0	0.0
130°-140°	0.0	0.0
140°-150°	0.0	0.0
150°-160°	0.0	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	447.8	35.1
0°-40°	692.9	54.3
0°-60°	1083.0	84.9
0°-90°	1275.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1275.0	100.0

CANDELA DISTRIBUTION:

	0°	90°	180°	270°	360°	Flux
0°	578	578	578	578	578	
5°	578	645	581	514	578	55
15°	543	793	551	381	543	153
25°	488	661	490	306	488	223
35°	398	360	405	254	398	249
45°	299	217	304	208	299	232
55°	205	152	206	161	205	183
65°	122	94	124	109	122	121
75°	57	46	59	55	57	61
85°	12	12	12	9	12	14
90°	0	0	0	0	0	

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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
0°	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9
2.5°	581.0	582.3	584.6	585.0	589.4	593.0	597.0	597.0	598.3	597.9	594.3
5°	578.3	582.3	588.1	593.0	601.0	604.5	609.9	613.9	617.4	620.1	619.6
7.5°	573.9	581.0	589.4	598.8	609.4	615.6	623.2	630.3	635.2	639.6	642.7
10°	566.3	578.3	589.9	602.3	616.1	624.5	633.4	642.7	650.3	658.7	666.7
12.5°	556.1	573.4	587.7	604.1	621.0	630.3	644.5	651.6	666.3	687.6	693.4
15°	543.2	566.8	580.1	601.0	623.2	630.7	650.3	661.8	692.0	705.4	721.4
17.5°	531.2	557.5	575.2	599.2	621.0	635.6	654.7	678.3	703.6	722.7	740.5
20°	521.5	546.8	568.1	594.8	622.3	641.0	661.0	689.4	716.9	736.5	750.2
22.5°	499.3	531.7	556.6	586.3	619.6	645.4	664.5	695.6	725.4	737.4	749.3
25°	488.2	516.1	545.0	578.8	617.9	648.5	665.0	699.6	725.8	730.2	732.9
27.5°	467.7	499.3	533.0	571.7	617.4	643.2	664.1	695.6	716.5	713.4	705.4
30°	442.4	481.1	518.4	560.1	611.2	639.2	658.7	687.6	698.3	682.3	668.1
32.5°	423.8	460.2	501.5	549.9	604.1	630.7	649.8	672.5	674.7	645.9	621.9
35°	398.4	438.9	485.5	536.6	592.1	616.1	633.9	647.6	637.0	596.5	568.1
37.5°	375.8	415.8	465.5	517.5	575.7	599.2	613.4	615.6	589.4	553.9	512.1
40°	350.9	392.2	444.2	498.8	557.5	577.9	586.8	580.1	542.4	501.0	452.6
42.5°	326.0	366.9	422.9	478.8	534.4	551.7	555.2	537.0	490.8	442.4	386.4
45°	298.9	341.6	397.5	454.0	507.7	517.5	517.9	491.7	437.1	386.4	334.5
47.5°	276.7	316.3	371.8	428.2	473.5	480.2	477.5	447.3	387.8	330.9	285.6
50°	252.3	290.1	345.1	400.7	439.3	441.1	434.4	391.3	333.1	281.2	245.2
52.5°	226.1	264.3	314.9	368.2	402.9	400.2	387.3	341.1	286.5	243.4	215.9
55°	205.2	239.0	286.5	338.5	362.9	355.4	341.1	294.1	251.0	214.5	190.6
57.5°	182.1	211.9	258.5	303.8	318.0	310.9	296.7	252.7	212.8	185.2	169.2
60°	160.4	187.4	228.3	266.1	277.2	269.6	253.2	213.7	184.8	161.7	149.7
62.5°	140.4	163.9	198.1	232.8	237.2	229.6	215.4	183.4	158.6	140.4	131.5
65°	121.7	143.9	171.5	197.7	201.7	193.7	179.0	155.9	135.0	123.5	115.0
67.5°	103.5	121.3	145.7	164.8	167.0	159.5	147.5	128.8	115.9	103.5	97.3
70°	87.5	100.8	119.9	135.5	136.4	129.3	123.0	106.2	96.4	87.5	82.6
72.5°	72.0	81.3	95.9	107.5	107.9	103.5	97.7	87.1	78.6	72.4	67.5
75°	56.9	64.9	73.7	84.0	83.5	80.0	75.5	68.8	61.7	57.7	55.5
77.5°	43.5	48.4	55.5	62.2	62.2	60.4	57.7	52.9	48.4	44.4	42.2
80°	31.1	34.2	40.0	42.2	43.1	42.6	40.4	36.9	35.1	32.0	31.1
82.5°	20.0	22.2	24.9	27.1	28.4	27.5	27.1	25.3	22.7	21.8	20.9
85°	11.5	12.4	13.8	15.1	15.5	15.1	16.0	14.7	13.3	13.3	12.9
87.5°	4.9	5.3	6.2	6.2	6.7	6.7	6.2	6.7	6.7	6.2	5.8
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

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CANDELA DISTRIBUTION (continued):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°	95°
0°	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9
2.5°	600.5	601.0	601.9	606.3	608.5	609.0	607.2	611.2	612.5	611.2	610.3
5°	629.0	631.6	637.0	642.7	642.3	642.7	645.4	648.1	649.0	645.4	646.7
7.5°	653.8	659.2	665.0	673.8	673.8	678.3	680.1	682.3	687.6	684.9	684.1
10°	682.3	689.4	700.0	714.3	714.7	719.1	723.6	730.7	732.9	731.1	732.0
12.5°	717.8	731.6	732.5	748.0	755.1	756.0	763.1	761.8	766.2	766.2	773.8
15°	733.4	754.7	766.7	781.8	786.2	780.9	786.7	792.9	793.3	793.3	792.9
17.5°	761.3	769.8	781.8	789.8	791.5	791.5	792.0	794.7	792.9	789.3	792.0
20°	767.1	770.7	775.1	774.2	775.1	770.7	766.2	761.8	762.2	760.0	766.7
22.5°	756.5	755.6	745.3	738.7	738.7	729.8	721.4	717.4	713.4	714.7	716.9
25°	729.8	716.0	703.6	693.8	691.6	677.4	665.8	662.3	655.6	661.0	661.8
27.5°	687.2	671.6	651.6	643.2	631.6	625.9	617.9	607.2	593.4	601.4	600.1
30°	641.4	618.3	601.9	581.4	563.2	561.9	546.8	529.0	521.9	521.9	525.9
32.5°	590.3	559.7	535.7	506.8	489.1	481.5	463.3	445.5	449.5	436.2	441.1
35°	530.8	490.4	460.2	432.2	418.9	410.0	386.4	376.7	366.0	359.8	371.3
37.5°	473.9	427.3	388.7	358.0	353.1	337.1	321.1	314.9	308.7	311.4	310.9
40°	404.7	363.3	328.7	304.7	296.3	288.7	278.1	270.5	266.5	268.7	269.2
42.5°	342.0	307.4	281.6	264.7	257.6	252.3	247.0	240.8	239.4	239.4	241.2
45°	293.6	265.2	247.9	234.1	230.1	226.1	222.1	219.4	218.5	216.8	218.1
47.5°	255.0	232.3	221.7	211.4	207.0	206.1	202.6	201.2	199.4	199.0	199.4
50°	222.5	208.3	198.6	192.8	189.7	188.3	186.6	183.9	183.0	185.2	184.3
52.5°	199.9	186.6	181.2	175.5	173.7	171.9	169.2	169.7	169.2	168.3	168.3
55°	177.2	168.8	163.5	159.0	158.6	156.8	154.6	153.7	153.2	152.4	153.7
57.5°	159.0	152.4	147.5	143.5	141.7	141.7	139.5	137.7	137.7	137.3	137.7
60°	140.8	134.1	131.0	127.0	125.7	125.3	123.9	123.0	121.7	121.7	121.7
62.5°	123.9	118.6	115.0	111.5	111.9	109.7	107.9	107.0	107.0	107.5	107.5
65°	107.9	104.4	99.9	96.8	95.9	95.5	94.6	94.2	92.8	93.7	93.7
67.5°	93.3	88.4	85.7	84.4	83.1	82.6	81.7	80.8	80.4	80.0	80.8
70°	78.6	74.6	72.4	71.5	70.2	69.7	69.3	68.0	68.4	68.8	69.3
72.5°	65.3	61.7	61.3	58.6	58.6	58.6	56.9	57.7	57.3	56.4	57.3
75°	51.5	49.7	48.9	47.5	48.0	47.5	47.1	45.8	45.8	46.2	46.6
77.5°	40.9	39.1	38.6	37.3	36.4	37.3	36.4	36.0	36.0	36.4	36.4
80°	30.2	29.3	28.0	28.0	28.0	27.5	27.5	27.5	27.1	26.7	27.1
82.5°	20.0	20.0	19.5	19.1	19.5	18.7	19.1	19.1	19.1	19.1	19.1
85°	12.9	12.4	12.4	12.0	12.0	12.0	12.4	11.5	11.5	12.0	12.0
87.5°	5.8	5.8	5.8	6.2	5.8	5.8	5.8	6.2	5.8	5.8	5.8
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

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CANDELA DISTRIBUTION (continued):

	100°	105°	110°	112.5°	115°	120°	125°	130°	135°	140°	145°
0°	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9
2.5°	612.5	609.4	606.8	607.2	609.4	607.7	603.2	597.4	595.2	592.5	595.2
5°	649.4	646.7	641.4	641.9	640.5	638.7	631.6	622.8	622.8	615.6	614.8
7.5°	685.8	681.8	678.3	677.4	672.5	668.9	662.7	650.3	645.4	637.0	632.1
10°	726.7	723.6	719.6	714.7	712.0	705.8	695.6	677.4	668.5	657.0	648.5
12.5°	768.0	767.6	758.7	748.9	748.5	738.7	731.6	707.1	695.2	679.6	659.6
15°	794.2	792.0	787.1	782.2	783.5	772.9	756.9	728.0	720.0	701.4	680.1
17.5°	793.8	793.8	792.4	791.5	790.2	787.1	778.2	759.1	746.2	722.7	702.7
20°	768.4	774.2	775.6	775.1	779.6	781.8	781.3	769.3	759.1	738.2	717.8
22.5°	717.8	731.1	736.9	740.5	749.8	754.7	766.2	761.8	759.1	743.6	726.2
25°	670.7	675.2	692.5	693.4	706.3	718.3	729.8	737.4	747.1	741.4	726.7
27.5°	609.9	620.1	632.5	641.9	644.5	668.9	688.0	702.3	724.5	726.2	721.4
30°	541.0	545.9	566.3	578.8	593.0	610.8	638.3	662.7	682.7	700.9	707.1
32.5°	457.1	477.1	489.1	504.2	516.6	548.1	581.9	613.4	636.5	667.2	680.5
35°	380.2	395.8	416.2	422.4	445.1	471.7	515.7	556.1	591.2	622.3	649.4
37.5°	316.7	329.1	350.9	360.7	374.0	408.2	445.1	495.3	537.5	575.7	609.4
40°	273.2	282.5	298.9	302.0	313.2	344.2	374.0	421.1	477.1	528.6	565.5
42.5°	243.4	247.9	259.0	263.0	270.1	290.9	317.6	362.0	414.0	467.3	519.3
45°	222.1	225.2	231.9	235.4	244.3	253.6	275.4	310.9	351.8	405.5	461.5
47.5°	203.0	207.0	209.7	211.9	216.8	227.0	241.2	267.4	306.5	355.8	410.0
50°	187.0	188.3	193.2	193.7	196.8	203.4	216.8	232.8	263.8	303.8	356.2
52.5°	171.0	172.3	175.5	178.6	179.9	185.2	194.1	207.4	230.5	262.1	308.7
55°	155.0	156.8	159.9	162.1	163.5	167.9	173.2	186.1	204.3	226.5	264.7
57.5°	139.0	143.0	143.9	145.2	147.5	152.4	157.2	164.8	179.0	199.4	227.4
60°	123.9	125.3	128.4	129.7	131.9	134.6	140.8	146.6	156.8	172.8	198.1
62.5°	108.4	111.5	112.8	114.2	115.9	119.0	123.0	129.3	138.1	151.0	171.0
65°	95.1	95.5	98.2	99.9	101.7	103.9	107.9	113.7	119.0	131.0	145.7
67.5°	82.2	83.1	84.0	85.7	87.9	90.2	93.7	96.8	103.5	111.5	123.0
70°	69.7	69.7	72.0	73.3	72.8	75.5	78.2	81.7	86.6	94.2	103.5
72.5°	58.6	58.2	60.0	60.4	61.3	63.1	64.9	68.4	71.1	76.8	84.0
75°	46.6	47.5	48.4	48.4	49.7	51.1	52.9	54.6	57.7	61.3	66.6
77.5°	36.9	36.9	37.8	38.2	39.5	39.1	40.9	42.6	44.9	48.0	52.0
80°	27.1	28.0	28.0	28.0	28.4	28.9	30.6	32.0	33.3	35.5	37.3
82.5°	19.1	19.1	20.0	20.0	20.0	20.9	20.9	21.3	22.2	23.5	24.9
85°	12.0	12.0	12.0	12.4	12.0	12.4	13.3	12.9	13.3	14.2	14.2
87.5°	5.8	5.8	5.8	5.8	5.8	6.2	5.8	6.2	6.7	6.7	6.7
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P997569

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CANDELA DISTRIBUTION (continued):

	150°	155°	157.5°	160°	165°	170°	175°	180°	185°	190°	195°
0°	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9
2.5°	593.0	590.8	589.4	590.3	587.7	581.0	581.0	583.2	580.6	577.9	573.9
5°	609.4	605.0	602.3	601.9	595.7	585.0	582.8	580.6	574.8	568.6	561.9
7.5°	625.4	617.4	613.0	609.9	601.0	587.2	581.4	576.6	567.2	557.9	549.5
10°	638.7	627.2	621.9	617.0	605.4	588.1	578.8	569.9	557.9	545.9	535.2
12.5°	649.4	636.1	629.4	622.3	608.1	585.4	573.9	559.7	547.7	531.7	521.0
15°	667.2	639.6	633.4	626.8	612.1	581.0	566.8	550.8	534.4	513.0	501.5
17.5°	681.4	644.5	644.1	629.9	610.8	579.2	557.5	536.6	518.8	497.5	479.3
20°	689.8	652.1	645.0	630.3	606.3	567.2	544.6	521.5	502.4	476.6	458.4
22.5°	696.9	662.7	644.1	626.3	597.0	563.2	529.9	508.2	481.9	454.0	436.6
25°	699.6	665.0	645.4	625.0	590.3	551.7	513.9	490.4	461.1	435.7	412.2
27.5°	700.0	664.5	640.5	619.2	581.0	536.6	497.9	473.1	440.6	411.3	387.8
30°	695.6	659.6	637.9	614.8	572.1	522.8	478.4	450.9	416.2	386.9	362.5
32.5°	682.3	649.8	632.1	606.8	560.6	503.7	459.7	429.1	392.7	363.8	340.2
35°	660.1	637.9	618.3	594.8	545.5	485.9	441.1	405.1	368.2	340.7	318.5
37.5°	632.5	620.5	602.3	579.2	528.1	470.0	420.2	380.2	343.4	316.7	294.9
40°	595.2	598.3	580.6	559.7	507.7	448.2	393.1	354.9	320.3	295.4	274.1
42.5°	554.8	567.7	557.5	537.5	485.1	424.2	373.1	330.9	297.2	271.4	253.6
45°	511.3	533.5	527.3	512.6	461.5	398.9	344.7	303.8	274.1	249.2	233.6
47.5°	463.7	495.3	495.3	484.6	435.3	373.6	320.3	278.5	249.2	231.4	216.3
50°	415.3	450.9	456.6	449.5	406.0	344.7	290.5	252.7	227.4	210.1	199.0
52.5°	364.7	406.0	416.6	413.1	374.9	317.2	266.1	229.2	206.1	191.0	181.2
55°	316.3	364.2	375.8	377.1	341.6	286.9	239.0	206.5	184.3	174.1	165.7
57.5°	270.5	316.7	329.6	331.8	307.8	259.4	213.7	185.2	165.2	156.8	150.1
60°	231.4	270.1	286.9	291.8	271.0	227.4	190.1	162.6	147.5	139.5	133.3
62.5°	199.4	230.5	248.3	249.6	240.3	199.4	165.7	142.6	129.7	122.6	119.5
65°	168.3	196.3	207.0	212.3	204.8	172.8	143.0	123.9	113.7	107.5	104.4
67.5°	143.5	161.2	170.1	177.2	169.7	145.7	121.7	106.2	98.6	92.4	90.6
70°	117.7	132.4	139.0	146.1	139.5	121.3	103.9	89.7	83.1	78.2	76.0
72.5°	94.2	105.7	111.9	116.4	112.4	97.3	83.1	73.3	68.4	64.9	63.5
75°	74.6	82.6	86.2	89.3	87.5	76.0	67.1	59.1	54.6	51.5	50.6
77.5°	56.9	62.6	66.6	67.5	65.3	57.7	50.2	45.3	41.8	40.0	39.1
80°	40.4	44.0	46.2	47.5	45.3	42.2	36.9	33.3	30.2	28.0	27.5
82.5°	27.1	28.9	30.6	30.2	29.3	26.7	23.5	21.8	20.4	18.7	18.7
85°	15.5	16.0	16.9	17.3	16.9	15.1	13.3	12.4	11.5	10.2	10.2
87.5°	6.7	7.1	7.1	7.6	6.7	6.7	5.8	4.9	4.9	4.4	4.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P997569

CATALOG NUMBER: SA2XXDP-B290DB2750-4F0-XX-W2A-A_3500K

CANDELA DISTRIBUTION (continued):

	200°	202.5°	205°	210°	215°	220°	225°	230°	235°	240°	245°
0°	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9
2.5°	571.7	573.9	573.4	569.0	564.1	560.1	552.6	553.5	550.8	551.2	553.9
5°	557.5	557.5	555.7	549.5	541.5	537.0	528.6	526.4	521.0	520.6	520.1
7.5°	542.4	540.1	537.9	529.0	519.3	512.1	500.6	497.9	492.6	489.1	487.3
10°	524.6	521.5	517.0	506.8	494.8	485.9	473.9	470.4	460.2	455.7	453.1
12.5°	505.0	503.3	496.2	487.7	468.2	458.4	441.1	444.6	434.4	425.5	424.2
15°	485.5	478.8	474.8	461.1	437.5	433.1	419.3	412.2	402.9	395.8	395.8
17.5°	466.4	456.2	447.3	432.6	415.3	402.9	392.7	389.1	377.6	370.5	369.1
20°	441.1	429.5	427.3	406.4	394.4	380.7	370.9	362.0	353.6	350.5	348.2
22.5°	417.1	403.8	400.2	382.4	370.5	356.7	346.9	340.7	334.5	332.3	328.3
25°	391.3	383.3	378.0	358.9	345.6	332.7	326.0	321.6	315.8	315.4	312.7
27.5°	366.5	358.9	353.6	335.4	325.6	313.6	308.3	303.4	300.3	298.9	297.6
30°	345.1	336.7	330.5	317.2	305.2	295.4	290.9	287.8	286.1	283.8	283.4
32.5°	321.6	316.7	308.3	298.1	288.7	279.4	276.7	274.5	271.8	271.0	270.5
35°	301.6	294.9	289.6	278.1	274.1	266.1	263.0	261.2	257.6	256.7	255.9
37.5°	282.1	275.8	270.1	263.0	255.4	251.0	249.2	246.5	244.7	245.2	244.3
40°	262.5	257.6	253.2	245.6	241.2	239.0	235.4	232.8	231.9	232.3	231.9
42.5°	243.4	239.0	236.3	230.5	226.1	223.9	221.7	219.0	220.3	220.3	221.7
45°	226.1	222.1	220.3	215.9	213.2	209.7	207.4	207.0	208.8	208.3	208.3
47.5°	208.3	207.0	204.8	200.8	197.2	195.0	194.6	194.6	196.3	197.2	196.8
50°	194.6	191.9	189.2	186.1	183.4	182.6	181.2	182.1	183.9	183.9	184.8
52.5°	177.2	175.5	174.6	171.9	170.1	170.1	170.1	170.6	171.9	173.2	172.8
55°	162.1	160.8	159.9	158.6	156.4	156.8	156.4	157.2	158.6	159.9	160.8
57.5°	146.1	145.7	144.8	142.6	142.6	142.1	143.5	143.9	146.1	147.0	148.4
60°	131.9	130.6	130.6	128.8	128.8	128.8	130.1	131.5	133.3	133.7	134.6
62.5°	116.8	116.8	116.4	115.0	115.0	116.4	116.8	118.6	119.5	119.5	120.8
65°	102.6	102.2	101.7	102.2	102.6	102.6	103.9	104.8	105.7	106.2	106.6
67.5°	88.4	87.9	88.8	88.4	89.3	91.1	90.6	91.9	93.3	93.3	93.7
70°	75.1	76.0	75.5	76.4	76.0	76.8	78.2	78.6	78.6	79.1	80.4
72.5°	62.6	62.6	62.6	62.2	62.6	63.5	64.4	64.9	65.7	66.2	67.5
75°	50.6	50.6	49.7	50.6	50.6	51.5	52.4	52.4	52.4	53.3	54.6
77.5°	38.2	38.6	38.2	39.1	39.1	39.5	40.4	40.0	40.9	41.3	41.8
80°	28.0	27.5	27.5	27.5	28.0	28.0	28.9	29.3	29.3	30.6	29.8
82.5°	17.8	18.2	17.8	18.2	18.2	18.7	18.2	18.7	19.1	20.0	19.5
85°	10.2	9.8	9.8	10.2	9.8	9.8	10.2	9.8	10.2	9.8	10.2
87.5°	4.0	3.6	3.6	3.6	3.6	3.1	3.1	2.7	2.7	2.7	2.2
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P997569

CATALOG NUMBER: SA2XXDP-B290DB2750-4F0-XX-W2A-A_3500K

CANDELA DISTRIBUTION (continued):

	247.5°	250°	255°	260°	265°	270°	275°	280°	285°	290°	292.5°
0°	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9
2.5°	550.8	552.1	549.0	548.1	549.0	545.9	546.8	547.7	547.7	549.0	549.9
5°	518.8	517.0	513.9	513.0	512.1	513.5	512.6	513.9	514.4	517.5	517.9
7.5°	487.3	484.6	481.9	479.3	478.4	476.2	478.4	478.4	481.5	480.6	482.8
10°	450.0	449.5	446.0	444.6	442.9	439.3	444.2	442.9	445.1	449.1	450.0
12.5°	422.4	417.5	419.8	413.5	415.8	412.2	412.7	412.7	416.2	416.6	415.8
15°	396.2	392.2	386.4	383.8	382.4	380.7	386.4	386.9	384.2	390.4	388.2
17.5°	369.6	369.6	364.2	362.9	359.3	361.1	360.2	360.7	359.8	364.2	366.5
20°	346.5	344.2	342.5	342.9	338.5	337.6	336.7	337.6	340.7	343.8	344.7
22.5°	327.8	326.5	322.0	322.9	319.4	320.7	319.8	322.0	322.5	322.5	325.6
25°	310.0	308.3	308.7	306.9	305.6	305.6	304.3	305.6	307.4	308.3	308.7
27.5°	296.7	295.4	293.2	291.8	292.7	290.5	292.3	293.6	293.6	292.7	293.6
30°	280.7	281.6	281.6	277.2	279.0	278.1	279.4	280.3	280.3	280.7	279.8
32.5°	270.1	267.4	267.0	266.5	266.5	264.7	264.7	266.1	266.5	267.0	268.3
35°	255.9	255.9	253.6	255.0	253.2	253.6	253.2	253.6	254.5	253.2	254.5
37.5°	243.0	243.4	242.5	243.4	243.9	243.0	242.1	243.9	243.0	243.0	242.1
40°	231.9	231.4	231.9	231.9	231.9	232.3	231.4	231.4	231.4	230.5	229.6
42.5°	222.5	219.9	220.8	221.2	219.9	219.9	220.3	219.9	221.2	218.5	218.5
45°	209.2	208.3	208.8	208.8	209.7	208.3	209.2	209.7	208.3	207.9	207.0
47.5°	197.2	198.1	197.2	198.1	198.1	199.0	197.2	197.7	198.1	196.3	195.0
50°	185.2	185.2	186.6	186.1	186.6	185.7	185.7	185.2	185.7	184.8	183.4
52.5°	174.1	172.8	175.0	174.6	174.1	173.7	173.2	173.7	172.8	171.9	171.9
55°	160.4	160.4	161.7	162.1	162.1	161.2	160.4	160.8	160.4	159.9	159.5
57.5°	149.2	147.5	148.4	148.8	148.8	147.5	148.4	147.5	147.5	147.9	146.6
60°	135.0	135.0	134.1	135.5	135.5	134.6	134.6	135.0	134.1	133.7	133.3
62.5°	119.9	120.4	121.7	122.2	122.6	121.7	120.8	121.3	121.3	119.9	120.4
65°	107.0	107.9	109.7	109.3	108.4	108.8	107.9	108.4	107.0	107.5	106.2
67.5°	94.6	94.2	94.6	94.6	95.5	95.1	94.2	94.2	93.7	95.1	93.7
70°	81.3	81.3	81.3	81.3	81.7	82.2	81.3	80.4	80.8	80.0	79.5
72.5°	67.5	68.0	67.5	68.4	67.1	68.0	68.0	67.5	67.1	67.1	67.1
75°	54.6	55.5	54.2	54.6	54.2	55.1	54.6	54.6	53.7	53.3	53.7
77.5°	41.8	42.2	41.3	41.8	41.3	41.8	41.8	41.3	41.3	41.3	41.3
80°	29.8	30.2	29.8	29.3	28.9	29.8	28.9	29.3	29.8	29.3	30.2
82.5°	19.1	19.1	18.7	19.1	18.2	18.2	18.7	18.7	18.2	19.1	18.2
85°	9.3	9.3	10.2	9.3	8.9	8.9	8.9	9.3	8.9	9.8	9.3
87.5°	2.2	1.8	2.2	2.2	1.8	1.8	2.2	1.8	2.2	2.7	1.8
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P997569

CATALOG NUMBER: SA2XXDP-B290DB2750-4F0-XX-W2A-A_3500K

CANDELA DISTRIBUTION (continued):

	295°	300°	305°	310°	315°	320°	325°	330°	335°	337.5°	340°
0°	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9	577.9
2.5°	548.6	552.1	550.8	545.9	551.7	551.7	555.7	555.7	560.6	562.3	565.0
5°	517.5	520.1	522.4	520.1	524.1	530.4	533.9	537.0	543.7	546.4	550.3
7.5°	484.2	489.1	491.3	491.3	497.9	505.0	512.1	516.6	525.9	529.5	533.5
10°	451.7	457.5	462.0	461.5	472.6	477.1	485.9	496.2	505.5	510.8	516.6
12.5°	417.5	420.6	426.9	435.7	438.4	446.4	456.6	469.5	486.4	491.3	499.7
15°	389.1	397.5	402.4	406.4	412.7	420.2	431.3	443.7	460.6	471.3	480.2
17.5°	365.1	376.2	379.3	378.4	386.4	398.0	410.9	420.2	435.3	448.2	456.6
20°	345.6	350.0	355.4	357.6	363.8	376.2	388.7	399.3	411.8	422.0	431.8
22.5°	326.0	329.6	334.0	338.0	342.9	350.0	362.0	375.3	387.3	397.1	408.2
25°	310.0	312.3	316.3	319.4	324.7	329.6	338.0	352.7	366.9	372.7	382.4
27.5°	294.5	296.3	298.9	302.5	305.2	310.0	317.6	329.6	344.2	350.0	363.3
30°	280.7	282.1	284.7	286.5	287.8	293.6	299.4	308.7	319.8	327.8	337.6
32.5°	267.8	269.2	271.8	272.3	274.1	277.2	282.5	290.9	300.7	307.4	315.8
35°	253.6	254.5	257.2	258.1	259.4	262.1	266.1	272.3	281.2	286.1	293.6
37.5°	242.5	242.1	243.9	245.2	247.0	248.3	249.6	255.9	262.5	267.0	272.7
40°	230.5	229.6	230.1	231.9	232.8	234.5	234.5	240.8	245.2	248.7	253.2
42.5°	218.5	218.1	217.2	218.1	219.0	219.4	219.9	224.3	228.8	231.9	236.8
45°	206.5	206.1	205.2	205.7	205.7	206.5	207.9	209.7	212.8	215.4	218.1
47.5°	195.4	194.6	193.2	192.8	193.7	193.7	193.7	195.4	198.6	199.4	202.1
50°	183.9	182.6	180.8	179.9	179.9	179.5	180.3	180.8	183.4	184.3	186.6
52.5°	171.5	170.6	168.8	167.0	167.5	166.6	167.0	167.5	168.3	169.7	171.0
55°	159.0	157.2	155.9	155.5	154.1	154.1	152.8	154.6	154.1	154.6	156.4
57.5°	147.0	145.2	143.0	142.1	140.8	140.4	139.5	139.0	139.5	140.8	142.1
60°	132.8	131.9	130.6	129.3	128.4	127.0	126.1	126.1	125.7	125.7	126.1
62.5°	119.0	118.6	116.8	116.4	115.5	114.6	113.3	112.4	112.4	113.3	113.7
65°	105.7	105.3	103.9	103.5	101.3	100.4	99.9	99.5	98.6	98.6	98.6
67.5°	93.3	91.9	91.9	89.7	87.9	87.1	86.2	85.7	85.7	85.7	86.2
70°	79.5	79.5	78.2	76.8	75.1	75.5	74.2	72.8	72.8	72.0	72.4
72.5°	66.2	65.7	64.4	64.0	62.6	61.3	60.4	61.3	60.0	59.5	60.0
75°	53.3	52.9	52.0	51.1	51.5	50.2	48.9	48.4	48.4	47.5	47.5
77.5°	40.9	41.8	40.0	39.5	38.6	37.8	37.3	36.9	36.9	36.9	37.8
80°	28.4	28.9	28.9	28.0	28.4	27.1	27.1	27.1	25.8	26.2	26.7
82.5°	18.2	18.2	17.8	18.2	17.8	17.8	17.3	17.3	16.9	16.9	17.3
85°	10.2	9.8	9.3	10.2	9.8	9.8	9.3	9.3	9.3	9.3	9.3
87.5°	2.2	2.7	2.7	2.7	2.7	3.1	3.1	3.1	3.6	3.6	3.6
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P997569

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CANDELA DISTRIBUTION (continued):

	345°	350°	355°	360°
0°	577.9	577.9	577.9	577.9
2.5°	567.2	567.2	573.9	581.0
5°	554.8	557.9	568.6	578.3
7.5°	542.8	548.1	561.5	573.9
10°	528.1	535.2	551.7	566.3
12.5°	513.9	520.6	539.7	556.1
15°	493.9	502.4	522.8	543.2
17.5°	473.9	482.4	507.3	531.2
20°	450.4	461.5	489.5	521.5
22.5°	428.6	442.4	473.5	499.3
25°	404.7	426.0	454.8	488.2
27.5°	383.3	404.7	434.0	467.7
30°	359.3	381.1	411.3	442.4
32.5°	336.3	356.2	385.6	423.8
35°	312.3	331.4	359.8	398.4
37.5°	290.5	309.2	340.2	375.8
40°	269.2	288.7	315.4	350.9
42.5°	249.2	266.5	290.5	326.0
45°	231.0	243.4	265.6	298.9
47.5°	211.9	223.0	243.4	276.7
50°	194.1	203.4	221.2	252.3
52.5°	176.8	184.8	201.2	226.1
55°	161.2	168.8	180.8	205.2
57.5°	145.2	151.0	162.6	182.1
60°	129.7	135.0	144.4	160.4
62.5°	114.2	118.6	127.5	140.4
65°	100.4	103.9	110.6	121.7
67.5°	87.1	89.3	94.6	103.5
70°	74.2	76.0	80.4	87.5
72.5°	60.4	62.2	67.1	72.0
75°	48.9	49.3	52.9	56.9
77.5°	38.2	37.8	40.4	43.5
80°	26.2	27.5	29.8	31.1
82.5°	17.8	18.2	19.1	20.0
85°	9.8	10.2	10.2	11.5
87.5°	4.0	4.4	4.4	4.9
90°	0.0	0.0	0.0	0.0

TEST NUMBER: P997569

CATALOG NUMBER: SA2XXDP-B290DB2750-4F0-XX-W2A-A_3500K

CIE UGR TABLE:

Reflectances:											
Ceiling		0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
Wall		0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
Reference plane		0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Room dimensions		Viewed crosswise					Viewed endwise				
X=2H	Y=2H	19.66	21.18	20.03	21.49	21.81	15.93	17.45	16.29	17.76	18.07
	3H	20.78	22.14	21.15	22.46	22.83	17.34	18.70	17.72	19.03	19.39
	4H	21.10	22.38	21.50	22.73	23.10	17.85	19.13	18.25	19.47	19.85
	6H	21.29	22.47	21.70	22.84	23.23	18.21	19.39	18.62	19.75	20.14
	8H	21.33	22.45	21.76	22.84	23.24	18.32	19.44	18.75	19.83	20.23
	12H	21.34	22.42	21.77	22.80	23.23	18.39	19.47	18.82	19.85	20.28
4H	2H	19.78	21.06	20.18	21.41	21.78	16.73	18.00	17.13	18.35	18.73
	3H	21.11	22.17	21.52	22.57	22.97	18.30	19.36	18.71	19.76	20.16
	4H	21.59	22.54	22.02	22.96	23.39	18.90	19.86	19.33	20.27	20.71
	6H	21.92	22.75	22.37	23.19	23.65	19.36	20.18	19.81	20.63	21.09
	8H	21.99	22.77	22.46	23.21	23.68	19.50	20.27	19.96	20.72	21.19
	12H	22.03	22.73	22.52	23.20	23.67	19.60	20.30	20.09	20.77	21.25
8H	4H	21.67	22.44	22.13	22.89	23.36	19.31	20.08	19.77	20.53	21.00
	6H	22.08	22.72	22.57	23.21	23.69	19.85	20.49	20.35	20.98	21.46
	8H	22.21	22.78	22.72	23.29	23.78	20.05	20.62	20.56	21.13	21.62
	12H	22.30	22.80	22.81	23.29	23.86	20.22	20.72	20.73	21.21	21.78
12H	4H	21.66	22.35	22.14	22.83	23.30	19.36	20.06	19.85	20.54	21.01
	6H	22.07	22.65	22.58	23.16	23.64	19.93	20.50	20.44	21.01	21.50
	8H	22.24	22.74	22.75	23.24	23.80	20.18	20.68	20.69	21.18	21.74

END OF REPORT